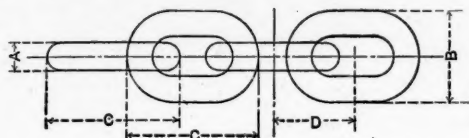


These data sheets are intended to be cut into four sections, 6 x 9 inches in size, as indicated by the straight lines. They may then be bound into note book form for convenient reference by means of staples inserted in holes punched at the points indicated. A suitable binder for these data sheets will be supplied for 25 cents. This binder has an open back and will hold an indefinite number of 6 x 9 sheets, depending on the length of staples used.

CRANE CHAIN.

(United States Navy Standard.)



Industrial Press, N.Y.

A	B	C	D	Lbs. per Foot.	Load in Pounds.	
					Ultimate.	Working.
1/4"	7/8"	1 1/8"	3 5/8"	.875	3360	670
5/16"	1 1/8"	1 3/8"	3 7/8"	1.000	5040	1000
3/8"	1 1/4"	1 5/8"	4 1/8"	1.70	7280	1460
7/8"	1 3/8"	2 1/8"	4 3/4"	2.00	10080	2020
1 1/8"	1 7/8"	2 3/8"	5 1/4"	2.50	13440	2690
1 3/8"	2 1/8"	3 1/8"	6 1/4"	3.20	16800	3360
1 7/8"	2 3/4"	3 3/4"	7 1/4"	4.125	20720	4140
2 1/8"	3 1/4"	4 1/4"	8 1/4"	5.00	25200	5040
2 3/8"	3 3/8"	4 3/8"	9 1/4"	5.875	30240	6050
2 7/8"	3 7/8"	4 7/8"	10 1/4"	6.70	35280	7060
3 1/8"	4 1/8"	5 1/8"	11 1/4"	8.00	40880	8180
3 3/8"	4 3/8"	5 3/8"	12 1/4"	9.00	47040	9410
3 7/8"	4 7/8"	5 7/8"	13 1/4"	10.70	53760	10750
4 1/8"	5 1/8"	6 1/8"	14 1/4"	11.20	60480	12100
4 3/8"	5 3/8"	6 3/8"	15 1/4"	12.50	68320	13660
4 7/8"	5 7/8"	6 7/8"	16 1/4"	13.70	76160	15230
5 1/8"	6 1/8"	7 1/8"	17 1/4"	16.00	84000	17000
5 3/8"	6 3/8"	7 3/8"	18 1/4"	16.50	91840	18400
5 7/8"	6 7/8"	7 7/8"	19 1/4"	18.40	101360	20300
6 1/8"	7 1/8"	8 1/8"	20 1/4"	19.70	109760	21900
6 3/8"	7 3/8"	8 3/8"	21 1/4"	21.70	120960	24200

TABLE FOR EYE BOLTS.

(Contributed by H. A. H.)



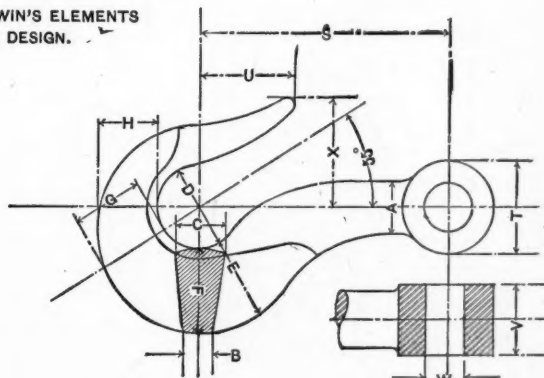
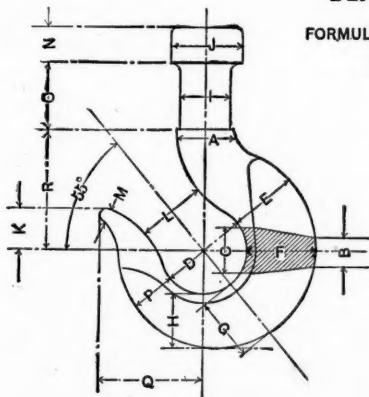
Industrial Press, N.Y.

A	B	C	D	E	F	G	Number of Threads per Inch.	Strength at Bottom of Thread S = 10,000 Pounds.	Strength of Untudded Chain Made from 6 Size Bar.
.375	2.	.75	.625	.1875	.375	.25	16	677	750
.5	2.125	1.	.75	.25	.5	.3125	13	1257	1172
.625	2.25	1.25	1.	.3125	.625	.4375	11	2018	2296
.75	2.375	1.4375	1.125	.3125	.6875	.5	10	3020	3000
.875	2.5	1.6875	1.375	.375	.75	.625	9	4194	4687
1.	2.75	1.875	1.5	.4875	.875	.75	8	5509	6750
1.125	2.875	2.125	1.625	.5	1.	.8125	7	6931	7921
1.25	3.	2.375	1.75	.5	1.125	.875	7	8899	9188
1.375	3.125	2.625	1.875	.5625	1.1875	1.	6	10541	12000
1.5	3.25	2.75	2.	.625	1.25	1.0625	6	12938	13546
1.625	3.375	3.	2.125	.6825	1.375	1.125	5.5	15149	15187
1.75	3.5	3.25	2.25	.75	1.5	1.25	5	17441	18750
1.875	3.625	3.5	2.375	.8125	1.625	1.3125	5	20490	20671
2.	3.75	3.75	2.5	.875	1.75	1.375	4.5	23001	22686

Supplement to MACHINERY, June, 1904.

PROPORTIONS OF HOOKS.

FORMULAS FROM UNWIN'S ELEMENTS OF MACHINE DESIGN.



Industrial Press, N.Y.

COMMON TO BOTH.										SWIVEL HOOK.										PLAIN HOOK.					
Tons.	Lbs.	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X
$\frac{1}{8}$	250	$\frac{5}{16}$	$\frac{5}{8}$	$\frac{3}{4}$	$1\frac{1}{8}$	$1\frac{1}{8}$	$\frac{3}{4}$	$\frac{3}{4}$	$\frac{3}{4}$	$\frac{1}{8}$	$\frac{1}{8}$	$\frac{1}{8}$	1	$\frac{7}{8}$	$\frac{3}{4}$	$\frac{1}{8}$	$\frac{3}{8}$	$1\frac{1}{8}$	$1\frac{1}{8}$	3	$1\frac{1}{8}$	$1\frac{1}{8}$	$1\frac{1}{8}$	$\frac{1}{8}$	$1\frac{1}{8}$
$\frac{1}{4}$	500	$\frac{1}{2}$	$1\frac{1}{8}$	$\frac{5}{8}$	$1\frac{1}{8}$	$\frac{1}{2}$	$\frac{5}{8}$	$\frac{5}{8}$	$\frac{5}{8}$	$\frac{1}{8}$	$\frac{1}{8}$	$\frac{3}{8}$	$1\frac{1}{8}$	$\frac{1}{2}$	$\frac{1}{2}$	$\frac{5}{8}$	$\frac{4}{8}$	$1\frac{1}{8}$	$1\frac{1}{8}$	$3\frac{1}{8}$	$1\frac{1}{8}$	$1\frac{1}{8}$	$\frac{7}{8}$	$\frac{5}{8}$	$1\frac{1}{8}$
$\frac{3}{8}$	1000	$\frac{3}{4}$	$1\frac{1}{8}$	$\frac{3}{4}$	$1\frac{1}{8}$	$1\frac{1}{8}$	1	$\frac{3}{4}$	$\frac{3}{4}$	$\frac{1}{8}$	$\frac{1}{8}$	$1\frac{1}{8}$	$1\frac{1}{8}$	$\frac{3}{4}$	$\frac{7}{8}$	$\frac{1}{2}$	$\frac{5}{8}$	$1\frac{1}{8}$	$1\frac{1}{8}$	$3\frac{1}{8}$	$1\frac{1}{8}$	$1\frac{1}{8}$	$1\frac{1}{8}$	$1\frac{1}{8}$	$1\frac{1}{8}$
1	2000	$1\frac{1}{8}$	$1\frac{1}{8}$	$1\frac{1}{8}$	$1\frac{1}{8}$	$1\frac{1}{8}$	$1\frac{3}{4}$	$1\frac{3}{4}$	$1\frac{3}{4}$	$\frac{1}{8}$	$1\frac{1}{8}$	$1\frac{1}{8}$	$1\frac{1}{8}$	$\frac{3}{4}$	$\frac{3}{4}$	$\frac{7}{8}$	$1\frac{1}{8}$	$2\frac{1}{8}$	$2\frac{1}{8}$	5	$1\frac{1}{8}$	$1\frac{1}{8}$	$1\frac{1}{8}$	$1\frac{1}{8}$	$2\frac{1}{8}$
$1\frac{1}{8}$	3000	$1\frac{1}{4}$	$1\frac{1}{8}$	$1\frac{3}{8}$	2	$1\frac{3}{4}$	$1\frac{3}{4}$	$1\frac{1}{2}$	$1\frac{3}{4}$	$1\frac{1}{8}$	$1\frac{1}{8}$	$1\frac{1}{8}$	$1\frac{1}{8}$	$\frac{5}{8}$	$\frac{5}{8}$	$1\frac{1}{8}$	$1\frac{1}{8}$	$2\frac{1}{8}$	$2\frac{1}{8}$	6	$2\frac{1}{8}$	$2\frac{1}{8}$	$1\frac{1}{8}$	$1\frac{1}{8}$	$2\frac{1}{8}$
2	4000	$1\frac{1}{2}$	$\frac{11}{8}$	$1\frac{7}{8}$	$2\frac{1}{4}$	$1\frac{1}{2}$	$1\frac{7}{8}$	$1\frac{3}{4}$	$1\frac{1}{8}$	$1\frac{1}{4}$	$1\frac{1}{2}$	$1\frac{1}{8}$	$1\frac{1}{8}$	$\frac{11}{8}$	$\frac{3}{2}$	$1\frac{1}{2}$	$1\frac{3}{4}$	$2\frac{1}{8}$	$2\frac{1}{8}$	$6\frac{1}{2}$	$2\frac{1}{8}$	$2\frac{1}{8}$	$1\frac{1}{2}$	$1\frac{1}{2}$	$2\frac{1}{8}$
3	6000	$1\frac{3}{4}$	$1\frac{7}{8}$	$1\frac{7}{8}$	$2\frac{1}{4}$	$1\frac{3}{4}$	$2\frac{1}{8}$	$2\frac{1}{4}$	$1\frac{3}{4}$	$1\frac{1}{8}$	$2\frac{1}{8}$	$1\frac{1}{2}$	2	$\frac{7}{8}$	$1\frac{1}{8}$	$1\frac{1}{8}$	$1\frac{7}{8}$	$3\frac{1}{8}$	$3\frac{1}{8}$	8	$3\frac{1}{8}$	$3\frac{1}{8}$	$2\frac{1}{8}$	$1\frac{1}{8}$	$3\frac{1}{8}$
4	8000	2	$\frac{1}{2}$	$1\frac{1}{4}$	$3\frac{1}{4}$	$2\frac{1}{4}$	$2\frac{3}{4}$	$2\frac{1}{8}$	$2\frac{1}{4}$	$1\frac{1}{4}$	$2\frac{1}{8}$	$2\frac{1}{4}$	$2\frac{1}{8}$	1	$1\frac{3}{4}$	2	$2\frac{1}{4}$	$4\frac{1}{8}$	$4\frac{1}{8}$	$9\frac{1}{2}$	$3\frac{1}{8}$	$3\frac{1}{8}$	$2\frac{1}{8}$	$1\frac{1}{4}$	4
5	10000	$2\frac{1}{4}$	$\frac{1}{8}$	$1\frac{1}{8}$	$3\frac{1}{4}$	$2\frac{1}{8}$	3	$2\frac{1}{4}$	$2\frac{3}{4}$	2	$2\frac{1}{8}$	$2\frac{1}{8}$	$2\frac{1}{8}$	$1\frac{1}{8}$	$1\frac{3}{4}$	$2\frac{1}{8}$	$2\frac{1}{8}$	$4\frac{1}{8}$	$4\frac{1}{8}$	10	4	4	$2\frac{1}{8}$	2	$4\frac{1}{8}$
6	12000	$2\frac{1}{2}$	$\frac{5}{8}$	$2\frac{1}{8}$	4	$2\frac{1}{4}$	$3\frac{1}{8}$	3	$2\frac{7}{8}$	$2\frac{1}{8}$	$3\frac{1}{8}$	$2\frac{1}{8}$	$3\frac{1}{8}$	$1\frac{1}{4}$	$1\frac{3}{4}$	$2\frac{1}{8}$	$2\frac{1}{8}$	$5\frac{1}{8}$	$5\frac{1}{8}$	$10\frac{1}{4}$	$4\frac{1}{8}$	$4\frac{1}{8}$	$3\frac{1}{8}$	$2\frac{1}{8}$	5
8	16000	$2\frac{3}{4}$	$\frac{3}{4}$	$2\frac{1}{4}$	$5\frac{1}{4}$	$3\frac{1}{8}$	$3\frac{7}{8}$	$3\frac{3}{4}$	$3\frac{1}{4}$	$2\frac{1}{8}$	$3\frac{5}{8}$	$3\frac{1}{8}$	$3\frac{1}{8}$	$1\frac{1}{8}$	$1\frac{3}{4}$	$3\frac{1}{8}$	$3\frac{1}{8}$	$6\frac{1}{8}$	$6\frac{1}{8}$	$10\frac{3}{8}$	5	5	$3\frac{1}{8}$	$2\frac{1}{8}$	$5\frac{1}{4}$
10	20000	$3\frac{1}{4}$	$1\frac{1}{2}$	$2\frac{1}{8}$	$6\frac{1}{4}$	$3\frac{1}{8}$	$4\frac{1}{8}$	$3\frac{3}{8}$	$3\frac{1}{4}$	$2\frac{1}{8}$	4	$4\frac{1}{4}$	$4\frac{1}{4}$	$1\frac{5}{8}$	$2\frac{3}{8}$	$4\frac{1}{4}$	$3\frac{7}{8}$	8	8	$10\frac{1}{2}$	$5\frac{1}{4}$	$5\frac{1}{4}$	4	$2\frac{1}{8}$	$6\frac{1}{4}$

Contributed by Walter Brown, Chicago, Ill.

Supplement to MACHINERY, June, 1904.